drifting slowly westwards at a height of about 300 feet and only occasionally beating its long narrow wings. Because of its dark coloration and buoyant flight, I believed it might be a Black Kite, but as it flew overhead it was clear that its tail was unforked. Suddenly the hawk wheeled round and, catching the south-westerly breeze, flew swiftly towards the north-east. With its wings beating rapidly, its profile was not unlike a Peregrine Falcon's.

If, as I believe, the bird was a Black Falcon (*Falco subniger*), it would be the first record of this rare hawk for the Swan River district.

-G. M. STORR, Western Australian Muscum.

Congenital Malformation of the Jaw in a Tiger Suake.— Born in captivity, one of a litter of fifteen Tiger Snakes (Notechis scutatus) died at 85 days old. This animal had obvious signs at birth of malformation of the upper jaw involving absence of half of the first labial (proximal to nasal scale) on the left side, and all of the first labial and portion of the nasal scale on the right side, along with underlying tissue on both sides of the snout. This gave the lip closing surface a serrated appearance. Additionally, the upper surface of the rostral splayed and separated the internasals. The bifurcate portion of the tongue was imperfect and the nasal orifices missing.

This animal, in all other respects normal, had never shown any inclination to feed itself and had never been observed to extrude the tongue.

It is probable that if this specimen had been caught in the bush, the disfigurement would have been attributed to injuries inflicted by a rodent predator.

-A. SOFTLY, Department of Microbiology, Royal Perth Hospital.

OBITUARY

W. B. ALEXANDER, M.A.

Wilfrid Backhouse Alexander, an Honorary Life Member of this Club, and former Keeper of Biology in the Western Australian Museum, died in retirement at Parkstone in Dorset, England on December 18, 1965. He had a varied scientific career and was in Australia, and later in England, a scientific catalyst, as it were, inspiring fruitful developments in many natural history studies. In this State he will always be remembered for his ornithological work which set in train the modern school of bird observers. His family's association with Australia, however, began early in the last century. His great grandfather on his mother's side was the well-known Quaker missionary, James Backhouse, whose book, *A Narrative of a Visit to the Australian Colonies* (London, 1843), is crammed with valuable observations on natural history. Backhouse was in Albany and Perth from December 1837 to February 1838 and two chapters in the book deal with this visit.

W.B.A. or W.B., as he was universally known in England in his later years, was born on February 4, 1885 at Croydon, Surrey and he and two of his three brothers were initiated into nature study by their two maternal uncles who were keen amateur naturalists—James Crosfield was primarily interested in birds and Albert Crosfield was an expert botanist. From his earliest boyhood one of his keenest pleasures was to join their Saturday excursions in the Surrey lanes and woods. Both of his uncles were



W. B. Alexander, 1920

careful and accurate in their field observations and recordings so W.B.A. and his brothers were early taught to be severely self-critical and to keep accurate and precise records. W.B.A. began making lists for the year and for separate counties when he was still a schoolboy and botany was his chief hobby from 1906 until he later went to Perth. He was educated at Bootham School, York, and Tonbridge School and owing to poor health did not go up to Cambridge until he was 21. He won the Vintner Exhibition at Kings College and took his degree in 1909, having passed the Natural Sciences Tripos in the first class.

Though Professor Alfred Newton was still at Cambridge during his earlier undergraduate years, Alexander never personally met that distinguished ornithologist. About the only chance of seeing Newton then was at those famous Sunday evening gatherings in his rooms at Magdalene College. so graphically described by A. F. R. Wollaston in his *Life of Alfred Newton* (London, 1921). I believe the veteran British ornithologist, David Bannerman, is the last survivor of those memorable evenings. As a matter of fact Alexander in his Cambridge days was not primarily concerned with ornithology. Botany was his hobby and he had other academic interests. He attended W. H. Gaskell's lectures on the origin of vertebrates and at times there was only one other student. Gaskell took an interest in him and would invite him to tea. Gaskell's unorthodox theory, as expounded in his book, *Origin of the Vertebrates* (London, 1908) had something of a vogue at the time and even temporarily mesmerised some senior members of the University Zoology Department. Alexander was greatly interested in genetics and attended the courses delivered by William Bateson. Bateson was easily confused in lecturing and would gaze despairingly at the blackboard and ask: "Can anyone tell me where I am wrong?" W.B.A. once helped him out and the grateful Bateson had him to tea. While at Cambridge W.B.A. did some research in genetical problems and published a paper, "Further experiments in the eross-breeding of two races of the moth *Acidalia virgularia*," in the *Proceedings of the Royal Society*, B, vol. 85, 1912, pp. 45-52.

After graduation he was appointed Assistant Superintendent of the Cambridge Museum of Zoology (1910-11) under Leonard Doncaster, who reported of him when he left: "I take this opportunity of expressing my very high appreciation of Mr. Alexander's services to the Museum; he has catalogued the greater part of the Invertebrates in the Museum stores, has made valuable preparations and given to the Museum a number of specimens. His loss will be severely felt." He also acted at this time as an assistant Demonstrator in Zoology and Comparative Anatomy. The post was resigned to take up an appointment as Assistant Naturalist to the Board of Agriculture and Fisheries, working on the movements of fish and drift bottle investigations in the programme for the international investigation of the North Sea. He resigned this position when in August 1911 he was appointed Assistant in the Western Australian Museum, and before he sailed lived for a while with his friend A. W. Hill (of Kings) who had become Assistant Director of Kew Gardens (later Sir Arthur Hill, Director of Kew in 1922).

He left England for Western Australia on January 31, 1912 and had as cabin companion on the ship Mr Justice Burnside of the Supreme Court bench in Perth. This friendship endured and he stayed with the judge at his house in Cottesloe till he settled down. He was also introduced to Mr Justice McMillan (later Chief Justice Sir Robert McMillan) and Dr. W. E. Blackall, the botanist. He was a frequent guest on the judges' yachts and made interesting natural history observations from them, including those on the memorable irruption of the White-winged Black Tern in 1917. Many fish collections made on these cruises are in the W.A. Museum.

His interest in marine biology stimulated him to capitalise on a tragic event which occurred soon after his arrival in Perth. The coastal steamship Koombana (Captain T. M. Allen) was lost at sea between Broome and Port Hedland in a willy-willy on March 21, and the Federal Fisheries Investigation Ship Endeavour (Captain G. W. C. Pim) was despatched to Western Australia to help in the rescue operations. In 1943 I obtained the following particulars of Alexander's role when the C.S.I.R.O. fisheries investigations began in this State and I was gathering data on the work of the Endeavour. His remarks may be quoted in full, not only because they remain almost the only record of this brief survey but because they illustrate the frustrations (even not yet a thing of the past) which often beset the scientific investigator at the hands of lay "experts."

I fear you are wrong in supposing that I kept records of all my doings in Western Australia and in particular of my trip on the ill-fated Endeavour^{*} I had only been in Perth about two months and naturally had only acquired a very slight knowledge of the fauna of W.A. at that time and I don't think I had begun to keep any sort of journal. However I can answer some of your questions from memory,

The Endeavour was sent over to W.A. to help in the search for survivors of one of the coastal steamers which had disappeared in a willywilly. Before she arrived at Fremantle wreckage of the steamer had been found so she was not needed for that purpose. Reading in the "West Australian" that she would do some experimental trawling before she returned to the east I persuaded Mr Woodward to ask the Commonwealth Government to allow me to accompany her to collect specimens for the W.A. Museum

^{*} She herself was lost at sea later, in December, 1914, on a voyage from Macquarie I land to Melbourne.

This was granted on condition that 1 did not take any "fish" as these were to be retained for the Commonwealth Collection.

Dannevig had not accompanied the boat to W.A. in view of the nature of her mission and the Captain (1 think his name was Pim) was in charge. He ruled that fish included crayfish and cuttlefish, but after an argument he allowed me to keep starfish! When the trawl was emptied on deck the edible fish were picked out and, occasionally, if the Captain saw one that struck him as curious, he put it in a bottle. Then everything else was shovelled overboard and 1 reseued what I could during this process. The eruise lasted a fortnight (1 think) and the ship worked for 8 hours a day going inshore and anehoring for the other 16. In the first week we worked up to Geraldton, where we spent the week-end, and in the second week we worked out near the Houtman's Abrolhos and, 1 think, spent our second week-end anchored there.

Nearly all the time was spent in sounding, and the bottom was almost everywhere rocky. I cannot be sure how many hauls were made but certainly not more than half-a-dozen. Nearly every time the trawl ultimately got caught and came up more or less torn and I think that it was finally completely wrecked in deep water on the edge of the continental shelf S. W. of the Abrolhos.

The chief feature of all the catches, which as far as 1 can remember were fairly similar, was the enormous mass of sponges that came up. The Museum Records will show you that Echinoderms were well represented—a large proportion proving to be of new species. The book containing the list of accessions to the Museum will 1 think indicate what clse 1 collected and your knowledge will probably enable you to judge what types of fish were likely to be associated with them. I must remind you again that I had no knowledge of Australian fish at that time, and was not allowed to keep any of those that were caught, even though a considerable proportion were not regarded as edible and were thrown overboard. My memory suggests that a large proportion were Leatherjackets and that those that were kept were chiefly Flatheads, but I cannot be sure of this. I know that a considerable proportion were more or less spiny, and that we caught a good many Numbfish, because they increased the difficulty of searching for specimens of those groups which I was allowed to collect.

The edible fish that had been caught were landed and sold at Geraldton. On further consideration I think we probably went from there straight to the Abrolhos and spent a night there (not a weekend) and that it was probably next day that the trawl was spoilt and that we then returned to Fremantle.

Alexander's major expedition in Western Australia was in company with Professor W. J. Dakin (first professor of biology at the University) on the first Percy Sladen Trust Expedition to the Abrolhos Islands in November 1913. The scientific results appeared in the journal of the Linnean Society of London and Alexander's contribution to these was on the vertebrates of the islands. This included a valuable account of the birds, in which he described a new sub-species.

His youthful interest in birds was revived about this time and henceforth was never lost, He later (in 1961) told Dr. W. R. P. Bourne that this interest was first fully roused when he met loeal ornithologists in Melbourne whilst working there during World War I and when the publishers Angus & Robertson asked him to write up the birds for the 2-volume Australian Encyclopaedia, edited by Jose and Carter, but which was not published until 1925 and 1926.

However his interest in botany continued and he encouraged local effort.

Mrs E. H. Pelloe in her book, *Wildflowers of Western Australia* (Melbourne, 1921), pays him a special tribute in her preface: "I am very deeply indebted to Mr W. B. Alexander, late of the Perth Museum, for his constant assistance in connection with my study of the wildflowers of Western Australia, and it is difficult to express my great appreciation of his courtesy and kindness." Which he first arrived at the Museum he donated to it about 450 botanical specimens from Britain and a further 185 from the Mediterrancan region; these are still generally in good condition though some were damaged by insects. Between 1912 and 1920 he donated to the museum about 170 specimens he collected in Western Australia. They were in excellent condition when incorporated in the collections of the Western Australian Herbarium in 1958.

After the Natural History and Science Society of Western Australia became the Royal Society of Western Australia in 1913 Alexander was elected its second honorary secretary and he contributed frequently to its proceedings, both in papers and exhibits. Years later John Clark, assistant Government Entomologist, usually a dour and critical appraiser of people, approvingly remembered him as the most gentlemanly secretary the society ever had!

Among the papers he read to the Society, apart from his description of the remarkable northern possum, Wyulda, perhaps the most outstanding and certainly the ones most consulted at the present day, are the series on the history of zoology in Western Australia. The first was read at a meeting on September 9, 1913 and the third on May 8, 1917. The three cover the period from the 17th Century to 1840 and the scholarly and detailed manner in which the subject is treated is an enormous help to anyone who wishes to refer to the work of the earlier zoologists. The biblio-graphical interests indicated by the preparation of these papers he always retained. He brought a fine library with him to Perth and on his departure from the State he donated several volumes to the Royal Society of Western Australia, Among these was the 3-volume account of the Baudin Expedition of 1800 to 1804 by Peron and Freycinet, Voyage de decouvertes aux Terres Australes (Paris, 1807-1816), in a handsome binding. This work is now catalogued at about \$300 by antiquarian book dealers. He also presented books to various friends and I treasure in my own library some valuable volumes on early exploration in this State which he presented to me in 1934. The bulk of his library was ultimately donated to the Edward Grey Institute in Oxford, of which more anon.

He threw himself with zest into local ornithology and was the first person to show what contributions to the study of marine birds might be made by patrolling the beaches after winter storms. His several papers in the *Emu* are of permanent value and culminated in "The Birds of the Swan River District" (1921) which was the most capable summary of the ornithology of any district in Australia available at the time; it is still an important reference and stimulated local observers for years after its publication.

In 1914 the British Association for the Advancement of Science met for the first and only time in Australia, but the event was marred to some extent by the almost simultaneous outbreak of World War I and some of the participants from enemy countries were arrested and interned. The president of the Australian meetings was Alexander's old Cambridge teacher William Bateson. Bateson insisted that Alexander accompany him throughout the official Australian tour and he thus travelled on the presidential train, which was otherwise reserved for the overseas visitors. Between August and October 1914 he travelled all over Australia with Bateson and left the party at Java, returning via Broome and Port Hedland. During the tour extensive collections of insects and marine specimens were made for the Museum.

He revitalised the Museum (where he was appointed Keeper of Biology in 1915, on the retirement of Bernard H. Woodward) and long after he left naturalists remember his wcll-arranged displays, including graphic exhibits illustrating evolutionary proeesses and adaptation, and the clear labels often written in his own bold, well-known hand. However it is plain from his annual reports to the President of the Museum Board that he was irked by the limitations imposed by the growing financial stringency of the institution. At one stage (1915-16) the taxidermist (O. H. Lipfert) could only be employed on half time. In his final report (for the year 1918-19) he wrote:

I desire to emphasise my opinion that if we are to continue to accept specimens of value on behalf of the State, it is essential that sufficient funds should be provided to allow of suitable storage accommodation being made available. During the war the Museum has dispensed with the services of a earpenter, and no new shelves, cupboards or cabinets have been obtained. Unless some additional storage room is provided shortly it will be necessary to refuse to accept responsibility for the proper storage of specimens. Under present circumstances it is practically impossible for me to undertake any proper scientific study of the collections received. Most of the specimens have to be put away with the hope that at some future date it may be possible to devote time to their study. In my opinion it should be recognised that the Museum is not carrying out its proper functions unless it is adding to the knowledge of the fauna and flora of the State by the publication of papers on these subjects. During the year I have published a description of a new marsupial and some notes on birds, as well as a paper on the history of zoology in the State. Most of the work was carried out in my own time, Until funds are available to allow of the appointment of an assistant biologist to relieve me of some of my routine duties, it will be impossible to find much time for what should be regarded as the proper work of a trained biologist in a museum.

During the War he eased the strain on the Museum's finances by being granted special leave without pay to serve as science abstractor for the newly formed Advisory Council of Science and Industry in Melbourne, being away from July 1916 until March 1919. The Advisory Council was the precursor of the C.S.I.R.O. Sir George Currie and Mr. John Graham, in their book, *The Origins of CSIRO* (Melbourne, 1966), wrote (p. 74): "Since funds were so very limited and it had no permanent laboratories of its own the Council was restricted in its methods of attacking problems. First, it sought to get all possible existing information about problems both at home and abroad and in this work the science abstractor, W. B. Alexander, was a key man -..." Whilst in Melbourne Alexander also acted as librarian to the Royal Australasian Ornithologists' Union. He finally resigned from the W.A. Museum in July 1920 after he obtained the appointment of biologist to the newly established Commonwealth Prickly Pear Board with headquarters at Sherwood, near Brisbane, Queensland—a body associated with the Advisory Council with which Alexander had just served.

Thus he had worked in Western Australia in the aggregate for only five years, but they were exceedingly productive years, both in scientific output, Museum displays (including new galleries) and the influence he exerted on local natural history. No doubt the frustrations due to penury in the Museum and the bleak prospects for the future induced him to forsake the West. A similar lack of eonfidence reigned at the time in the University. His friend Professor W. J. Dakin resigned the biology chair in the same year whilst Professor W. G. Woolnough (professor of geology) quit the previous year. A contemporary member of the University staff, referring to the declining morale and feeling of instability in the University wrote: "The best men were beginning to feel uncomfortable, were wondering if they could stay there" (F. Alexander, *Campus at Crawley*, 1963: 108).

Whilst he was living in Queensland he actively associated himself with Australian ornithology. He was vice-president of the Royal Australasian Ornithologists' Union between 1923 and 1925, was editor of the Emu in 1924-25, and was a member of the committee which produced the 2nd edition of the R.A.O.U. Checklist of Australian Birds. The R.A.O.U. honoured him by electing him one of its few Fellows.

Alexander was promoted to officer in charge of the prickly pear (Opuntia) investigations in 1924, though he had acted in that capacity since the previous year. He went abroad in connection with the investigations on at least two occasions, and was the first person successfully to introduce from the Argentine the eventual control agent, the moth *Cactoblastis cactorum*. About the middle of 1925, after having laid the basis for the successful fulfilment of the investigations, he resigned his post and left Australia for good.

The prickly pear investigations represent the most notable example of the triumph of biological control of a plant pest, and a pest so serious that at one stage it was engulfing agricultural lands at the rate of 2½ million acres per annum and at its peak had immobilised an area of about 65 million acres. When I visited him at Oxford in 1955 Alexander told me something of the personal background of these investigations and the desperate search for a control. He said it was Henry Tryon, Queensland Government Entomologist, who proposed that insects should be introduced to combat the pear and Tryon and Dr. T. Harvey Johnston, of the Queensland University, were sent abroad for a survey. They quarrelled fiercely and returned on non-speaking terms, Notwithstanding this inauspicious start the eventual success of the operation was due to the teamwork of a number of people.

In Buenos Aires he met the American ornithologists James: Lee Peters and Alexander Wetmore and earlier, on his first overseas trip on the prickly pear work, he met the marine ornithologist Robert Cushman Murphy. The last-mentioned was instrumental in channelling his energies in a new direction—oceanic birds. The interest aroused in sea-birds whilst beach-combing at Cottesloe was developed further on his prickly pear voyages and he realised the general need for an adequate identification book. So after leaving Australia, and apart from attending the American Ornithologists' Union congress at Ottawa, he spent most of 1926 with Murphy at the American Museum of Natural History preparing the *Birds of the Ocean* (New York, 1928). It was written in just under a year and with its diagrammatic sketches, drawn by himself, of birds side by side, pioneered a new phase of ornithological publishing, brilliantly exploited later by Roger Tory Peterson. Alexander's book is hailed as the first ornithological field guide. Mr Peterson is now gathering materials for a modern seabird guide of his own, but in a touching regard for the possible feelings of the pioneer he had refrained from announcing the scheme or publishing the book until after Alexander's death.

After completing this project Alexander continued on to England and was interested in the Strickland Curatorship at Cambridge, a post that Newton had founded to maintain his work, collections and library. But the professor at the time (J. Stanley Gardiner) was unsympathetic and the appointment, "founded to keep ornithology alive in its first home in Britain, was given to a palaeontologist and serious ornithology at Cambridge became a preserve of the undergraduates" (vide Dr. Bourne). Incidentally one of the most brilliant of these, David Lack, later carried the torch to Oxford where professional ornithology flourished in that university in what was to become the Edward Grey Institute of Field Ornithology. Alexander, a bachelor with modest private means, was without a regular post for some time, but in 1929 he was appointed superintendent of the Tees estuary survey and he established the main lines of the investigation in a sound and masterly manner^{*}. He resigned from this post in October 1930 (but continued as a member of the River Tees Survey Committee, under the chairmanship of Professor G. C. Bourne) when at long last he was able to enter professional ornithology as director of the Oxford Bird Census founded by E. M. Nicholson and B. W. Tucker. This developed into the Edward Grey Institute and he served first as director of it and later librarian until he suffered a stroke in 1955.

His later English career is well covered in biographies eited at the end of this contribution—reprints of these are being bound and will be available for reference in the Club's library. One may mention, however, that among the various projects with which he was associated at Oxford was the pioneering of the British bird observatory scheme, a chain of which now girdle the British Isles. E. M. Nicholson, in his obituary of him, paid the following tribute: "His record stands as that of one without whom the modern revolution in British ornithology might well have proved abortive." He had very early donated his magnificent collection of bird books to his Oxford institute, where it was named the Alexander Library after him. On his death he willed the sum of f5,000 towards its maintenance. Among the British awards he received was the Union Medal of the British Trust for Ornithology (1955). He was vice-president of the B.O.U. at the time of his death. In America he had been elected a Corresponding Fellow of the A.O.U.

Though he was never fated to re-visit Australia after he left it in 1925 he maintained an active interest in its ornithology and was in frequent correspondence with local ornithologists. Though he rarely published on sea-bird subjects, for instance, after his sea-bird book, he kept an almost eagle eye on sea-bird problems and entered into technical discussions with Australian workers as oceasion demanded (as he did with me frequently). Australian visitors to England were always welcomed and he would readily take them on tours around the English countryside (cf. V. Serventy, *A Continent in Danger*, London, 1966, p. 195; A. H. Chisholm, 1967). He had a variety of interests, which he was delighted to share with them—past history, archaeology, inn signs—and we all gained the impression that he fully enjoyed life, in being able to do the things that pleased him.

Western Australian affairs had a particular interest for him —he onee told me he had spent the happiest years of his life in this State. He was always prepared to provide information for local bird workers and enjoyed hearing local bird news, and among the last items which enthralled him was to hear the account of the rediscovery of the Noisy Serub-bird from Mr. J. B. Higham of Albany, when the latter visited him at Swanage in 1962. Among his regular Perth correspondents was the late Miss Enid Allum, daughter of his old friend, F. E. Allum, sometime Deputy Master of the Royal Mint in Perth, and a former president of the Royal Society of Western Australia. About King's Park and the proposal to establish a botanical garden there he wrote to her in 1959:

I am in agreement with much that he (Dr. Stewart) says but a good deal depends on the relative areas to be treated in various ways. I suppose the area to be used for a botanic garden for native plants would be comparatively small compared with the total area of the park but I feel dubious about his suggestion that it might be gradually enlarged to include foreign plants.

^a W. B. Alexander, B. A. Soulhgate and R. Bassindale, 1935, Survey of the River Tees. Part 11. The Estuary.—Chemical and Biological. D.S.I.R. Water Pollution Research, Tech. Paper No. 5, H.M. Stationery Office, London.

It seems to me that this sort of garden, if desired, should not eneroach on Kings Park but be developed somewhere else, perhaps near the Zoo. He apparently considers the matter from a purely botanical standpoint but the park preserves not only an area of the native vegetation but also a sample of the native fauna of the bush. Even if no kangaroos remain in it 1 imagine there are small marsupials and lizards, snakes, insects, spiders, etc. which will gradually disappear if the area is greatly reduced. However, I trust there are now enough zoologists at the University and Museum to ensure that this is kept in mind.

Alexander's last illness started on September 10, about three months before he died. Previous to that he was mentally alert, although he eould not walk. He read a great deal, and very critically, telling the librarian at Swanage whether a book was bad or good. He liked biographies, and Jane Austen, Trollope and Hardy, reading almost all of Hardy's novels. After his illness he seemed to relapse into the past and his dreams were of events of long ago, and they seemed real to him. He told his brother (H. G. Alexander) on one occasion that he had been asked to translate a French passage for his old friend Justice Burnside. He did not know why he had to do this but he was pleased to be able to do so.

Scientific publications:

A complete list of W. B. Alexander's papers on Australian ornithology (numbering some 65 items) is given by H. M. Whittell, in *The Literature of Australian Birds*, 1954, pp. 5-8. The following list contains his other Australian contributions in zoology and botany:

Aptera of Australia. Rept. Australas. Assoc. for the Adv. of Sc., Melbourne meeting 1913, 14, 1914: 267-271.

Western Australian Echinoderms. Rec. W. Aust. Mus., 1 (3), 1914: 105-112.

On a Specimen of *Regalecus glesne*, Asean., obtained in Western Australia. *Rec. W. Aust. Mus.*, 1 (3), 1914: 236-238.

A Brachiopod New to Australian Waters. *Rec. W. Aust. Mus.*, 1 (3), 1914: 239-240.

Aquatie Animals from Hannan's Lake, Kalgoorlie. Journ. Nat. Hist. and Sc. Soc. W. Aust., 5, 1914: 47-48.

[Notes on exhibits. freshwater erayfish and brachiopod]. Journ. Nat. Hist. and Sc. Soc. W. Aust., 5, 1914: xiii.

Obituary: Mr Richard Helms. Journ. and Proc. Roy. Soc. W. Aust., 1, 1916: xxviii-xxix.

On a Stomatopod new to Australia, with a list of the Western Australian Species of the Order. *Journ. and Proc. Roy. Soc. W. Aust.*, 1, 1916: 8-9.

Further Notes on WA., Stomatopods. Journ. and Proc. Roy. Soc. W. Aust., 1, 1916: 9-10.

List of Orthopterous Insects Recorded from Western Australia Journ. Roy. Soc. W. Aust., 2, 1917: 97-103.

Description of a New Species of Fish of the Genus Evoxymetopon, Poey. Journ. Roy. Soc. W. Aust., 2, 1917: 104-105. [E. anzac]

A New Species of Marsupial of the Sub-family Phalangerinae. Journ. Roy. Soc. W. Aust., 4, 1919: 31-36 [Wyulda squamicaudatus]

The Priekly Pear in Australia. Institute of Science and Industry, Australia, Bull. No. 12, 1919, 48 pp., Govt. Printer, Melbourne. Notes on Western Australian Lampreys. Journ. Roy. Soc. W. Aust., 6 (1), 1921: 21-22.

List of the Principal Indigenous Australian Plants of Economic Importance and of Naturalised Aliens and Weeds established in the State, with their Vernacular Names. *Journ. Roy. Soc. W. Aust.*, 6 (1), 1921: 41-46. [With C. E. Lane-Poolc and D. A. Herbert.]

The Vertebrate Fauna of Houtman's Abrolhos (Abrolhos Islands), Western Australia. *Journ. Linn. Soc. London, Zoology, 34, 1922: 457-486.* [Percy Sladen Trust Expedition under the leadership of Professor W. J. Dakin.]

Notes on the Fat-tailed Marsupial Mouse (Sminthopsis crassicaudata). Mcm. Queensland Mus., 7 (4), 1922: 295-296.

The Earliest Descriptions of Australian Animals. *Queensland Nat.*, 1924, November: 107-108.

Natural Enemies of Prickly Pear and their Introduction into Australia. Institute of Science and Industry, Bull No. 29, 1925. 80 pp.

The Prickly Pears Acclimatised in Australia. Commonwealth Prickly Pear Board, 1925, 41 pp. Govt. Printer, Sydney.

Variation of the Acclimatised Species of Prickly Pear (Opuntia). Proc. Roy. Soc. Qucensland, 38 (3), 1926: 47-54.

Biographical Articles: The following biographies have been published:

Alexander, W. B. Bird Observatories and Migration— Presidential Address to the Yorkshire Naturalists' Union. *The Naturalist* (Leeds), No. 828, 1949; 1-8 [contains some autobiographical information].

Lack, D. Nature, vol. 209, no. 5925, February 19, 1966: 759-760.

Nicholson, E. M. British Birds, 59 (3), March 1966: 125-128 (with portrait).

Campbell, B. Bird Study, 13 (1), March 1966: 1-4 (with portraits).

Adams, J. K. Ibis, 108 (2), April 1966: 288-289.

Bourne, W. R. P. Scabird Bulletin (England), 2, July 1966: 9.

Meiklejohn, M. F. M., Scottish Birds, 4 (3), Autumn 1966: 258-259.

Chisholm, A. H. *Emu*, 1967 (in press).

Storr, G. M. Annual Report W.A. Museum, 1967 (in press).

-D.L.S.